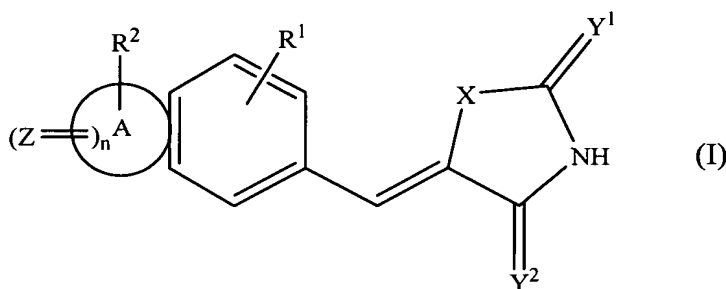


IN THE CLAIMS

Please amend the claims as follows:

Claim 1 (Currently Amended): A method for the prophylaxis and/or treatment of one or more diseases or disorders, selected from autoimmune disorders and/or inflammatory diseases, cardiovascular diseases, neurodegenerative diseases, bacterial or viral infections, kidney diseases, platelet aggregation, cancer, graft rejection or lung injuries, comprising, administering to a subject in need thereof, an effective amount of Use of a compound of according to formula (I):



as well as its geometrical isomers, its optically active forms as enantiomers, diastereomers and its racemate forms, as well as pharmaceutically acceptable salts and pharmaceutically active derivatives thereof, wherein

A is a 5-8 membered heterocyclic or carbocyclic group, wherein said carbocyclic group may be fused with aryl, heteroaryl, cycloalkyl or heterocycloalkyl;

X is S, O or NH;

Y¹ and Y² are independently S, O or NH NH;

Z is S or O;

R¹ is H, CN, carboxy, acyl, C₁-C₆-alkoxy, halogen, hydroxy, acyloxy, C₁-C₆-alkyl carboxy, C₁-C₆-alkyl acyloxy, C₁-C₆-alkyl alkoxy, alkoxycarbonyl, C₁-C₆-alkyl alkoxycarbonyl, aminocarbonyl, C₁-C₆-alkyl aminocarbonyl, acylamino, C₁-C₆-alkyl acylamino, ureido, C₁-C₆-alkyl ureido, amino, C₁-C₆-alkyl amino, ammonium, sulfonyloxy,

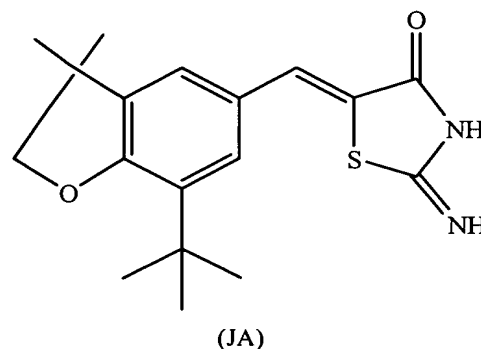
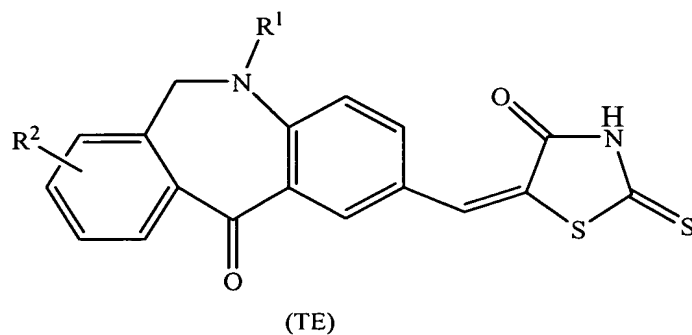
C₁-C₆-alkyl sulfonyloxy, sulfonyl, C₁-C₆-alkyl sulfonyl, sulfinyl, C₁-C₆-alkyl sulfinyl, sulfanyl, C₁-C₆-alkyl sulfanyl, sulfonylamino, C₁-C₆-alkyl sulfonylamino or carbamate;

R² is selected from the group ~~comprising or~~ consisting of H, halogen, acyl, amino, C₁-C₆-alkyl, C₂-C₆-alkenyl, C₂-C₆-alkynyl, C₁-C₆-alkyl carboxy, C₁-C₆-alkyl acyl, C₁-C₆-alkyl alkoxy, C₁-C₆-alkyl aminocarbonyl, C₁-C₆-alkyl acyloxy, C₁-C₆-alkyl acylamino, C₁-C₆-alkyl ureido, C₁-C₆-alkyl amino, C₁-C₆-alkyl alkoxy, C₁-C₆-alkyl sulfanyl, C₁-C₆-alkyl sulfinyl, C₁-C₆-alkyl sulfonyl, C₁-C₆-alkyl sulfonylaminoaryl, aryl, C₃-C₈-cycloalkyl or heterocycloalkyl, C₁-C₆-alkyl aryl, C₂-C₆-alkenyl-aryl, C₂-C₆-alkynyl aryl, carboxy, cyano, hydroxy, C₁-C₆-alkoxy, nitro, acylamino, ureido, C₁-C₆-alkyl carbamate, sulfonylamino, sulfanyl, or sulfonyl;

n is 0, 1 or 2;

~~for the preparation of a medicament for the prophylaxis and/or treatment of autoimmune disorders and/or inflammatory diseases, cardiovascular diseases, neurodegenerative diseases, bacterial or viral infections, kidney diseases, platelet aggregation, cancer, graft rejection or lung injuries;~~

with the proviso that the following compounds are excluded:



wherein R¹ is a lower alkyl or aralkyl and R² is H or a halogen.

Claim 2 (Currently Amended): The method Use of a compound according to claim 1, wherein said one or more diseases are selected from ~~in~~ the group consisting of including multiple sclerosis, psoriasis, rheumatoid arthritis, ~~multiple sclerosis~~[[,]] systemic lupus erythematosus, inflammatory bowel disease, lung inflammation, and thrombosis or brain infection/inflammation such as meningitis or encephalitis.

Claim 3 (Currently Amended): The method Use of a compound according to claim 1, wherein said one or more diseases are selected from ~~in~~ the group consisting of including Alzheimer's disease, Huntington's disease, CNS trauma, stroke and ~~or~~ ischemic conditions.

Claim 4 (Currently Amended): The method Use of a compound according to claim 1, wherein said one or more diseases are selected from ~~in~~ the group consisting of including atherosclerosis, heart hypertrophy, cardiac myocyte dysfunction, elevated blood pressure and ~~or~~ vasoconstriction.

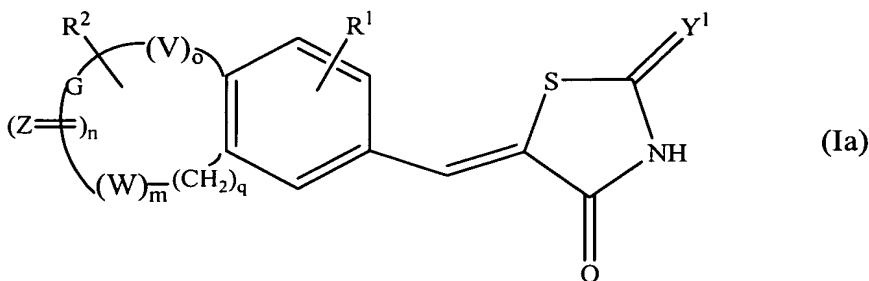
Claim 5 (Currently Amended): The method Use of a compound according to claim 1, wherein said one or more diseases or disorders are selected from ~~in~~ the group consisting of including chronic obstructive pulmonary disease, anaphylactic shock fibrosis, psoriasis, allergic diseases, asthma, stroke or ischemic conditions, ischemia reperfusion, platelets aggregation/activation, skeletal muscle atrophy/hypertrophy, leukocyte recruitment in cancer tissue, pancreatitis, multiorgane failure, angiogenesis, invasion metastasis, ~~in particular~~ melanoma, Karposi's sarcoma, acute and chronic bacterial and viral infections, sepsis, transplantation graft rejection, glomerulo sclerosis, glomerulo nephritis, progressive renal fibrosis, endothelial and epithelial injuries in the lung and ~~or in~~ general lung airways inflammation.

Claim 6 (Currently Amended): The method Use according to claim 1 ~~any of the precedent claims~~, wherein Y¹ and Y² are both oxygen.

Claim 7 (Currently Amended): The method Use according to claim 1 ~~any of the precedent claims~~, wherein n is 1 or 2 and R¹ and R² are both H.

Claim 8 (Currently Amended): The method Use of compounds according to claim 1 ~~any of the preceding claims~~, wherein, in the compound of formula (I), X is S, Y¹ and Y² are both O, ~~R¹ and R² are as above defined~~ and n is 0.

Claim 9 (Currently Amended): The method Use according to claim 1 ~~any of the precedent claims~~, whereby the compound of formula (I) is a thiazolidinone-vinyl fused-benzene derivative of ~~has~~ the formula (Ia)



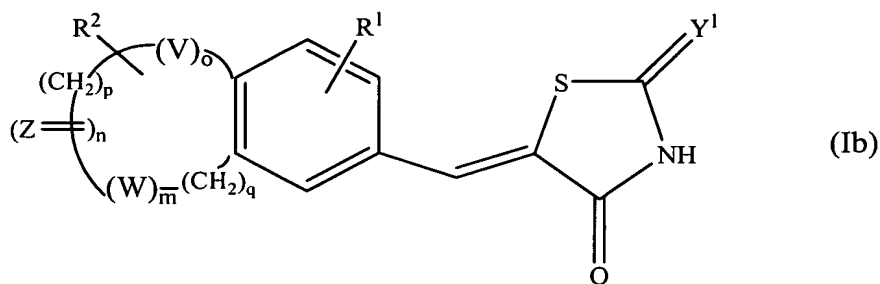
wherein Y¹, R¹, R², Z and n are as above defined for the compound of formula (I);
V and W are each, independently from each other, O, S or -NR³ wherein R³ is H or C₁-C₆ alkyl;

G is a C₁-C₅ alkylene or a C₁-C₅ alkenylene group;

o and m are each, independently from each other, 0 or 1; and

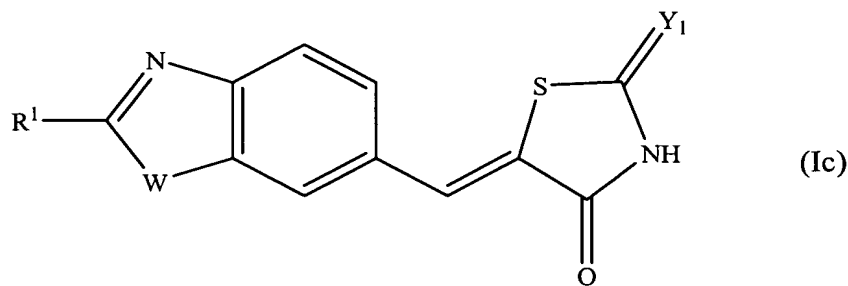
q is an integer from 0 to 4.

Claim 10 (Currently Amended): The method Use according to claim 9, whereby the thiazolidinone-vinyl fused-benzene derivative has the formula (Ib):



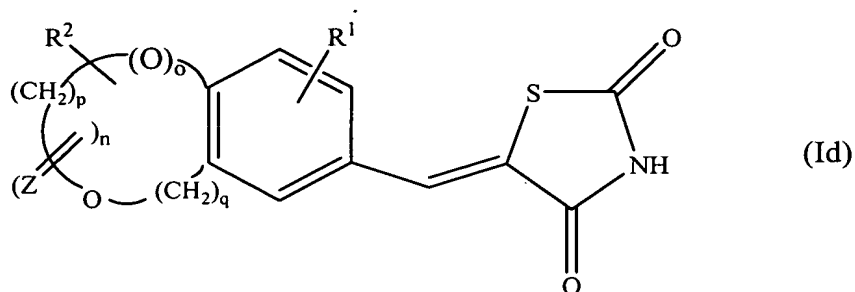
wherein Y^1 , R^1 , R^2 , V , Z , W , m , n , o , q are as above defined in the compound of formula (Ia), and p is an integer from 1 to 4.

Claim 11 (Currently Amended): The method Use according to claim 9 ~~any of claims 9 or 10~~, whereby the thiazolidinone-vinyl fused-benzene derivative has the formula (Ic):



wherein W , as well as R^1 and Y^1 , are as above defined in the compound of formula (Ia).

Claim 12 (Currently Amended): The method Use according to claim 9 ~~any of claims 9 or 10~~, whereby the thiazolidinone-vinyl fused-benzene derivative has the formula (Id):



wherein R^1 , R^2 , Z and n are as above defined in formula (Ia); o is 0 or 1;

p is an integer from 1 to 4 and q is an integer from 0 to 4.

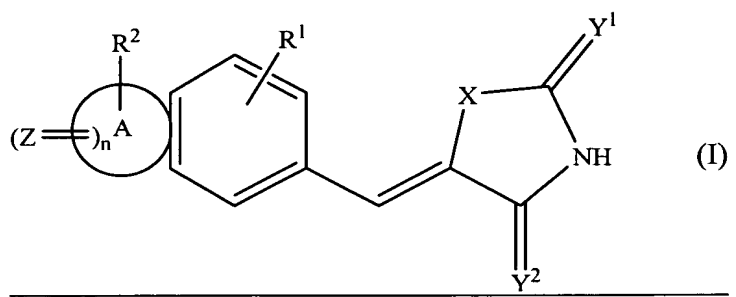
Claim 13 (Currently Amended): The method Use of compounds according to claim 9, any of claims 9, 10 or 12 wherein, in formula (Ia), Z is O, m is 0, n is 1, p is 1 or 2, q is 1, and R^1 and R^2 are each as above defined for the compound of formula (Ia).

Claim 14 (Currently Amended): The method Use of compounds according to claim 9, any of claims 9, 10 or 12 wherein, in formula (Ia), m is 1, n is 0, p is 1 or 2, q is 0, and R^1 and R^2 are each as above defined for the compound of formula (Ia).

Claim 15 (Currently Amended): The method Use according to claim 9, any of claims 9, 10 and 12 to 14 wherein, in formula (Ia), m is 0, n is 1, p is 1 or 2, q is 0, and R^1 and R^2 are each as defined above in claim 1 for the compound of formula (I).

Claim 16 (Currently Amended): The method Use according to claim 9, any of claims 9, 10 and 12 to 14 wherein, in formula (Ia), R^1 is halogen or hydrogen.

Claim 17 (Currently Amended): A method for the prophylaxis and/or treatment of one or more diseases mediated by PI3 kinase, comprising administering to a subject in need thereof, an effective amount of a compound of formula (I): ~~Use according to any of claims 1 to 16 for the modulation, in particular for the inhibition, of the PI3 kinase activity~~



as well as its geometrical isomers, its optically active forms as enantiomers, diastereomers and its racemate forms, as well as pharmaceutically acceptable salts and pharmaceutically active derivatives thereof, wherein

A is a 5-8 membered heterocyclic or carbocyclic group, wherein said carbocyclic group may be fused with aryl, heteroaryl, cycloalkyl or heterocycloalkyl;

X is S, O or NH;

Y¹ and Y² are independently S, O or NH;

Z is S or O;

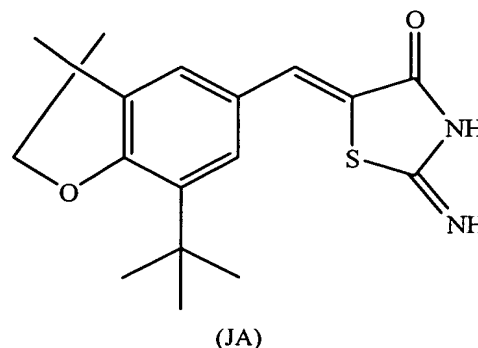
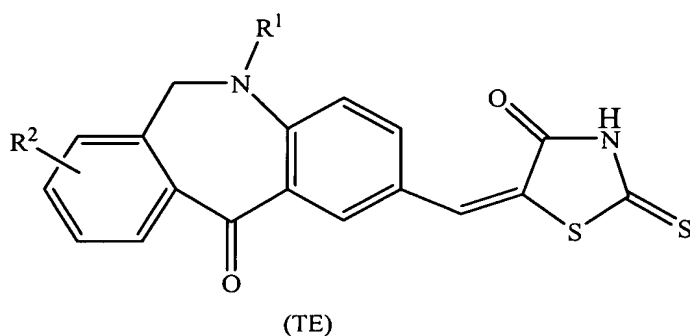
R¹ is H, CN, carboxy, acyl, C₁-C₆-alkoxy, halogen, hydroxy, acyloxy, C₁-C₆-alkyl carboxy, C₁-C₆-alkyl acyloxy, C₁-C₆-alkyl alkoxy, alkoxycarbonyl, C₁-C₆-alkyl alkoxycarbonyl, aminocarbonyl, C₁-C₆-alkyl aminocarbonyl, acylamino, C₁-C₆-alkyl acylamino, ureido, C₁-C₆-alkyl ureido, amino, C₁-C₆-alkyl amino, ammonium, sulfonyloxy, C₁-C₆-alkyl sulfonyloxy, sulfonyl, C₁-C₆-alkyl sulfonyl, sulfinyl, C₁-C₆-alkyl sulfinyl, sulfanyl, C₁-C₆-alkyl sulfanyl, sulfonylamino, C₁-C₆-alkyl sulfonylamino or carbamate;

R² is selected from the group consisting of H, halogen, acyl, amino, C₁-C₆-alkyl, C₂-C₆-alkenyl, C₂-C₆-alkynyl, C₁-C₆-alkyl carboxy, C₁-C₆-alkyl acyl, C₁-C₆-alkyl

alkoxycarbonyl, C₁-C₆-alkyl aminocarbonyl, C₁-C₆-alkyl acyloxy, C₁-C₆-alkyl acylamino, C₁-C₆-alkyl ureido, C₁-C₆-alkyl amino, C₁-C₆-alkyl alkoxy, C₁-C₆-alkyl sulfanyl, C₁-C₆-alkyl sulfinyl, C₁-C₆-alkyl sulfonyl, C₁-C₆-alkyl sulfonylaminoaryl, aryl, C₃-C₈-cycloalkyl or heterocycloalkyl, C₁-C₆-alkyl aryl, C₂-C₆-alkenyl-aryl, C₂-C₆-alkynyl aryl, carboxy, cyano, hydroxy, C₁-C₆-alkoxy, nitro, acylamino, ureido, C₁-C₆-alkyl carbamate, sulfonylamino, sulfanyl, and sulfonyl;

n is 0, 1 or 2;

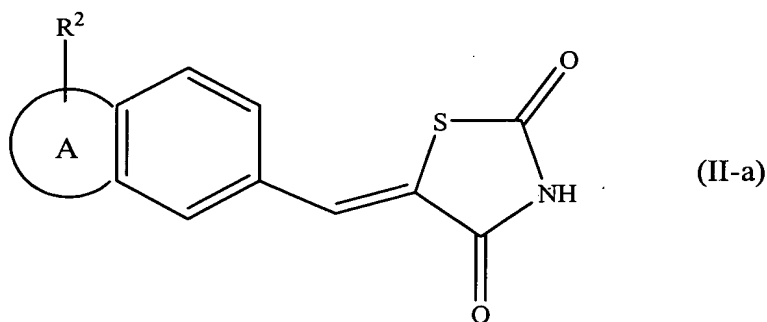
with the proviso that the following compounds are excluded



wherein R¹ is a lower alkyl or aralkyl and R² is H or a halogen.

Claim 18 (Currently Amended): The method Use according to claim 17, wherein said PI3 kinase is a PI3 kinase γ .

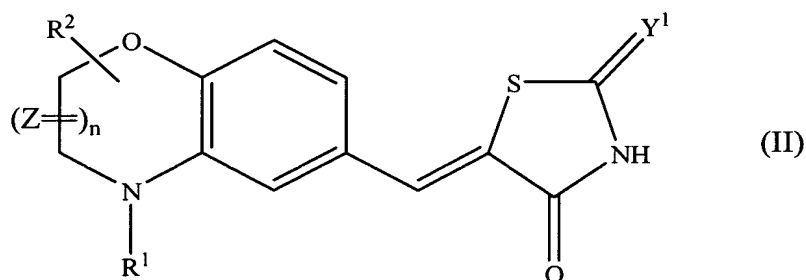
Claim 19 (Currently Amended): A thiazolidinone-vinyl fused-benzene derivative according to formula (II-a):



wherein A is selected from the group consisting of dioxol, dioxin, dihydrofuran, (dihydro) furanyl, (dihydro)oxazinyl, pyridinyl, isooxazolyl, oxazolyl (dihydro)naphthalenyl, pyrimidinyl, triazolyl, imidazolyl, pyrazinyl, thiazolidinyl, thiadiazolyl, and oxadiazolyl;

R² is selected from the group ~~comprising or~~ consisting of H, halogen, acyl, amino, C₁-C₆-alkyl, C₂-C₆-alkenyl, C₂-C₆-alkenyl, C₁-C₆-alkyl carboxy, C₁-C₆-alkyl acyl, C₁-C₆-alkyl alkoxycarbonyl, C₁-C₆-alkyl aminocarbonyl, C₁-C₆-alkyl acyloxy, C₁-C₆-alkyl acylamino, C₁-C₆-alkyl ureido, C₁-C₆-alkyl carbamate, C₁-C₆-alkyl amino, C₁-C₆-alkyl alkoxy, C₁-C₆-alkyl sulfanyl, C₁-C₆-alkyl sulfinyl, C₁-C₆-alkyl sulfonyl, C₁-C₆-alkyl sulfonylaminoaryl, aryl, C₃-C₈-cycloalkyl or heterocycloalkyl, C₁-C₆-alkyl aryl, C₂-C₆-alkenyl-aryl, C₂-C₆-alkynyl aryl, carboxy, cyano, hydroxy, C₁-C₆-alkoxy, nitro, acylamino, ureido, sulfonylamino, sulfanyl, and ~~or~~ sulfonyl.

Claim 20 (Currently Amended): A thiazolidinone-vinyl fused-benzene derivative according to formula (II):



as well as its geometrical isomers, its optically active forms as enantiomers, diastereomers and its racemate forms, as well as pharmaceutically acceptable salts and pharmaceutically active derivatives thereof, wherein

Y¹ is S, O or NH;

Z is S or O;

R¹ is H, CN, carboxy, acyl, C₁-C₆-alkoxy, halogen, hydroxy, acyloxy, C₁-C₆-alkyl carboxy, C₁-C₆-alkyl acyloxy, C₁-C₆-alkyl alkoxy, alkoxycarbonyl, C₁-C₆-alkyl alkoxycarbonyl, aminocarbonyl, C₁-C₆-alkyl aminocarbonyl, acylamino, C₁-C₆-alkyl acylamino, ureido, C₁-C₆-alkyl ureido, amino, C₁-C₆-alkyl amino, ammonium, sulfonyloxy, C₁-C₆-alkyl sulfonyloxy, sulfonyl, C₁-C₆-alkyl sulfonyl, sulfinyl, C₁-C₆-alkyl sulfinyl, sulfanyl, C₁-C₆-alkyl sulfanyl, sulfonylamino, C₁-C₆-alkyl sulfonylamino or carbamate;

R² is selected from the group consisting of H, halogen, acyl, amino, C₁-C₆-alkyl, C₂-C₆-alkenyl, C₂-C₆-alkynyl, C₁-C₆-alkyl carboxy, C₁-C₆-alkyl acyl, C₁-C₆-alkyl alkoxycarbonyl, C₁-C₆-alkyl aminocarbonyl, C₁-C₆-alkyl acyloxy, C₁-C₆-alkyl acylamino, C₁-C₆-alkyl ureido, C₁-C₆-alkyl amino, C₁-C₆-alkyl alkoxy, C₁-C₆-alkyl sulfanyl, C₁-C₆-alkyl sulfinyl, C₁-C₆-alkyl sulfonyl, C₁-C₆-alkyl sulfonylaminoaryl, aryl, C₃-C₈-cycloalkyl or heterocycloalkyl, C₁-C₆-alkyl aryl, C₂-C₆-alkenyl-aryl, C₂-C₆-alkynyl aryl, carboxy, cyano, hydroxy, C₁-C₆-alkoxy, nitro, acylamino, ureido, C₁-C₆-alkyl carbamate, sulfonylamino, sulfanyl, and sulfonyl;

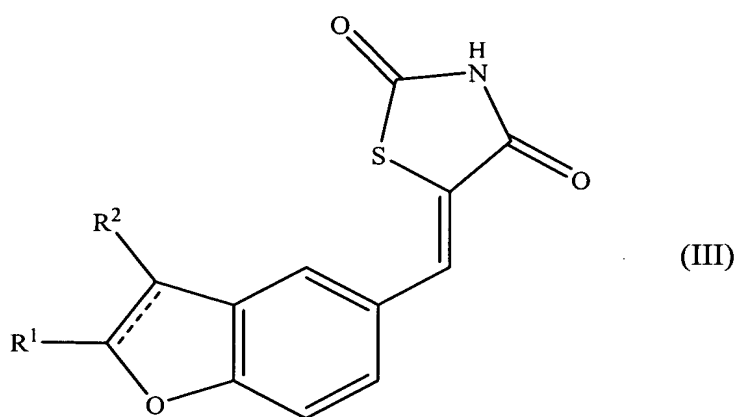
n is 0 or 1

Z, Y¹, R¹, R² are as above defined, n is 0 or 1.

Claim 21 (Currently Amended): The A thiazolidinone-vinyl fused-benzene derivative according to claim 20, wherein Y¹ is O.

Claim 22 (Currently Amended): The A thiazolidinone-vinyl fused-benzene derivative according to claim 20 ~~any claims 20 or 21~~, wherein R¹ is selected from ~~in~~ the group consisting of C₁-C₆-alkyl, C₁-C₆-alkyl aryl, aryl, C₃-C₈-cycloalkyl or heterocycloalkyl, C₁-C₆-alkyl aryl, C₂-C₆-alkenyl-aryl and ~~or~~ C₂-C₆-alkynyl aryl.

Claim 23 (Currently Amended): A thiazolidinone-vinyl fused-benzene derivative according to formula (III):



as well as its geometrical isomers, its optically active forms as enantiomers, diastereomers and its racemate forms, as well as pharmaceutically acceptable salts and pharmaceutically active derivatives thereof, and wherein

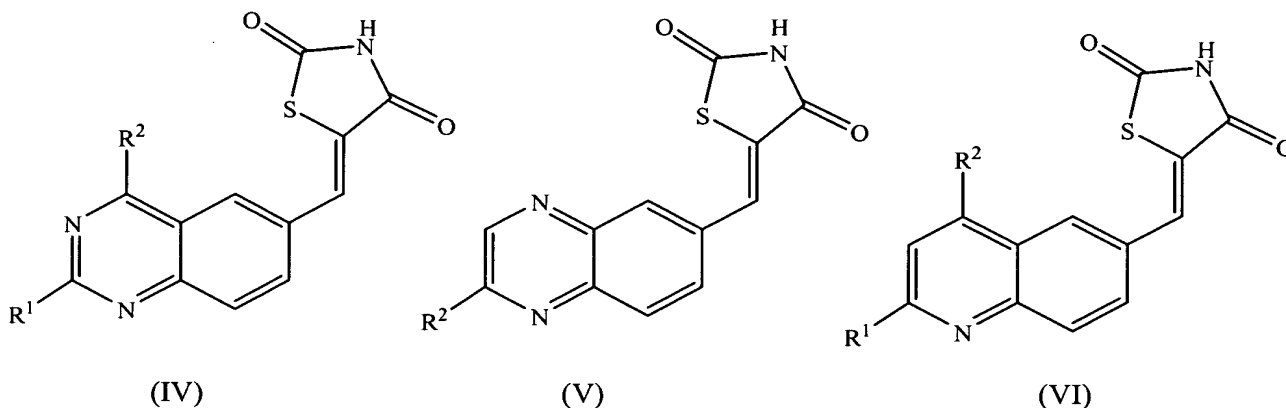
R¹ is H, CN, carboxy, acyl, C₁-C₆-alkoxy, halogen, hydroxy, acyloxy, C₁-C₆-alkyl carboxy, C₁-C₆-alkyl acyloxy, C₁-C₆-alkyl alkoxy, alkoxycarbonyl, C₁-C₆-alkyl alkoxycarbonyl, aminocarbonyl, C₁-C₆-alkyl aminocarbonyl, acylamino, C₁-C₆-alkyl acylamino, ureido, C₁-C₆-alkyl ureido, amino, C₁-C₆-alkyl amino, ammonium, sulfonyloxy, C₁-C₆-alkyl sulfonyloxy, sulfonyl, C₁-C₆-alkyl sulfonyl, sulfinyl, C₁-C₆-alkyl sulfinyl, sulfanyl, C₁-C₆-alkyl sulfanyl, sulfonylamino, C₁-C₆-alkyl sulfonylamino or carbamate;

R² is selected from the group consisting of H, halogen, acyl, amino, C₁-C₆-alkyl, C₂-C₆-alkenyl, C₂-C₆-alkynyl, C₁-C₆-alkyl carboxy, C₁-C₆-alkyl acyl, C₁-C₆-alkyl

alkoxycarbonyl, C₁-C₆-alkyl aminocarbonyl, C₁-C₆-alkyl acyloxy, C₁-C₆-alkyl acylamino, C₁-C₆-alkyl ureido, C₁-C₆-alkyl amino, C₁-C₆-alkyl alkoxy, C₁-C₆-alkyl sulfanyl, C₁-C₆-alkyl sulfinyl, C₁-C₆-alkyl sulfonyl, C₁-C₆-alkyl sulfonylaminoaryl, aryl, C₃-C₈-cycloalkyl or heterocycloalkyl, C₁-C₆-alkyl aryl, C₂-C₆-alkenyl-aryl, C₂-C₆-alkynyl aryl, carboxy, cyano, hydroxy, C₁-C₆-alkoxy, nitro, acylamino, ureido, C₁-C₆-alkyl carbamate, sulfonylamino, sulfanyl, and sulfonyl

wherein R¹ and R² is as above defined.

Claim 24 (Currently Amended): A thiazolidinone-vinyl fused-benzene derivative according any of formulae (IV), (V) and (VI):



wherein R¹ is selected from the group consisting of hydrogen, halogen, cyano, C₁-C₆-alkyl, C₁-C₆-alkoxy, acyl, and alkoxy cabonyl, ~~while R² is as above defined and~~

R² is selected from the group consisting of H, halogen, acyl, amino, C₁-C₆-alkyl, C₂-C₆-alkenyl, C₂-C₆-alkynyl, C₁-C₆-alkyl carboxy, C₁-C₆-alkyl acyl, C₁-C₆-alkyl alkoxycarbonyl, C₁-C₆-alkyl aminocarbonyl, C₁-C₆-alkyl acyloxy, C₁-C₆-alkyl acylamino, C₁-C₆-alkyl ureido, C₁-C₆-alkyl amino, C₁-C₆-alkyl alkoxy, C₁-C₆-alkyl sulfanyl, C₁-C₆-alkyl sulfinyl, C₁-C₆-alkyl sulfonyl, C₁-C₆-alkyl sulfonylaminoaryl, aryl, C₃-C₈-cycloalkyl or heterocycloalkyl, C₁-C₆-alkyl aryl, C₂-C₆-alkenyl-aryl, C₂-C₆-alkynyl aryl, carboxy, cyano,

hydroxy, C₁-C₆-alkoxy, nitro, acylamino, ureido, C₁-C₆-alkyl carbamate, sulfonylamino, sulfanyl, and sulfonyl.

Claim 25 (Currently Amended): The A thiazolidinone-vinyl fused-benzene derivative according to claim 19, ~~any of claims 19 to 24~~ selected from the group consisting of:

- 5-(1,3-benzodioxol-5-ylmethylene)-1,3-thiazolidine-2,4-dione₁
- 5-(1,3-benzodioxol-5-ylmethylene)-2-thioxo-1,3-thiazolidin-4-one₁
- 5-(2,3-dihydro-1,4-benzodioxin-6-ylmethylene)-1,3-thiazolidine-2,4-dione₁
- 5-(2,3-dihydro-1-benzofuran-5-ylmethylene)-1,3-thiazolidine-2,4-dione₁
- 5-[(7-methoxy-1,3-benzodioxol-5-yl)methylene]-1,3-thiazolidine-2,4-dione₁
- 5-[(9,10-dioxo-9,10-dihydroanthracen-2-yl)methylene]-1,3-thiazolidine-2,4-dione₁
- (5-[(2,2-difluoro-1,3-benzodioxol-5-yl)methylene]-1,3-thiazolidine-2,4-dione₁
- (5Z)-5-(1,3-dihydro-2-benzofuran-5-ylmethylene)-1,3-thiazolidine-2,4-dione₁
- 5-(1-benzofuran-5-ylmethylene)-1,3-thiazolidine-2,4-dione₁
- 5-[(4-methyl-3-oxo-3,4-dihydro-2H-1,4-benzoxazin-6-yl)methylene]-1,3-thiazolidine-2,4-dione₁
- 5-(1,3-benzodioxol-5-ylmethylene)-2-imino-1,3-thiazolidin-4-one₁
- 5-Quinolin-6-ylmethylene-thiazolidine-2,4-dione₁
- 5-Quinolin-6-ylmethylene-2-thioxo-thiazolidin-4-one₁
- 2-Imino-5-quinolin-6-ylmethylene-thiazolidin-4-one₁
- 5-(3-Methyl-benzo[d]isoxazol-5-ylmethylene)-thiazolidine-2,4-dione₁
- 5-(4-Phenyl-quinazolin-6-ylmethylene)-thiazolidine-2,4-dione₁
- 5-(4-Dimethylamino-quinazolin-6-ylmethylene)-thiazolidine-2,4-dione₁
- 5-[(4-aminoquinazolin-6-yl)methylene]-1,3-thiazolidine-2,4-dione₁

5-[(4-piperidin-1-ylquinazolin-6-yl)methylene]-1,3-thiazolidine-2,4-dione,
5-[(4-morpholin-4-ylquinazolin-6-yl)methylene]-1,3-thiazolidine-2,4-dione,
5-[[4-(benzylamino)quinazolin-6-yl]methylene]-1,3-thiazolidine-2,4-dione,
5-[[4-(diethylamino)quinazolin-6-yl]methylene]-1,3-thiazolidine-2,4-dione,
5-({4-[(pyridin-2-ylmethyl)amino]quinazolin-6-yl}methylene)-1,3-thiazolidine-2,4-
dione,
5-({4-[(pyridin-3-ylmethyl)amino]quinazolin-6-yl}methylene)-1,3-thiazolidine-2,4-
dione,
ethyl 1-{6-[(2,4-dioxo-1,3-thiazolidin-5-ylidene)methyl]quinazolin-4-yl}piperidine-3-
carboxylate,
ethyl 1-{6-[(2,4-dioxo-1,3-thiazolidin-5-ylidene)methyl]quinazolin-4-yl}piperidine-4-
carboxylate,
tert-butyl 1-{6-[(2,4-dioxo-1,3-thiazolidin-5-ylidene)methyl]quinazolin-4-yl}-L-
prolinate,
5-{ [4-(4-methylpiperazin-1-yl)quinazolin-6-yl]methylene}-1,3-thiazolidine-2,4-
dione,
5-{[4-(4-pyrimidin-2-ylpiperazin-1-yl)quinazolin-6-yl]methylene}-1,3-thiazolidine-
2,4-dione,
5-({4-[4-(4-fluorophenyl)piperidin-1-yl]quinazolin-6-yl }methylene)-1,3-thiazolidine-
2,4-dione,
5-{ [4-(4-benzylpiperidin-1-yl)quinazolin-6-yl]methylene}-1,3-thiazolidine-2,4-dione,
5-({4-[4-(2-phenylethyl)piperidin-1-yl]quinazolin-6-yl}methylene)-1,3-thiazolidine-
2,4-dione,
5-{ [4-(4-methylpiperidin-1-yl)quinazolin-6-yl]methylene}-1,3-thiazolidine-2,4-dione,

5-{ [4-(4-hydroxypiperidin-1-yl)quinazolin-6-yl]methylene}-1,3-thiazolidine-2,4-dione,

1-[6-(2,4-Dioxo-thiazolidin-5-ylidenemethyl)-quinazolin-4-yl]-piperidine-4-carboxylic acid,

1-[6-(2,4-Dioxo-thiazolidin-5-ylidenemethyl)-quinazolin-4-yl]-piperidine-3-carboxylic acid,

1-[6-(2,4-Dioxo-thiazolidin-5-ylidenemethyl)-quinazolin-4-yl]-pyrrolidine-2-carboxylic acid,

5-(4-Methylamino-quinazolin-6-ylmethylene)-thiazolidine-2,4-dione,

5-(4-Methoxy-quinazolin-6-ylmethylene)-thiazolidine-2,4-dione

2-Imino-5-(4-methylamino-quinazolin-6-ylmethylene)-thiazolidin-4-one,

2-Imino-5-(4-piperidine-quinazolin-6-ylmethylene)-thiazolidin-4-one,

2-Imino-5-(4-dimethylamino-quinazolin-6-ylmethylene)-thiazolidin-4-one,

5-(2-Methyl-2H-benzotriazol-5-ylmethylene)-thiazolidine-2,4-dione,

5-(3-Methyl-3H-benzotriazol-5-ylmethylene)-thiazolidine-2,4-dione,

5-(3-Ethyl-3H-benzoimidazol-5-ylmethylene)-thiazolidine-2,4-dione,

5-{[1-(4-phenylbutyl)-1H-benzimidazol-6-yl]methylene}-1,3-thiazolidine-2,4-dione,

5-[(1-prop-2-yn-1-yl-1H-benzimidazol-6-yl)methylene]-1,3-thiazolidine-2,4-dione,

5-[(1-{2-[4-(trifluoromethyl)phenyl] ethyl} -1H-benzimidazol-6-yl)methylene]-1,3-thiazolidine-2,4-dione,

5-({1-[2-(4-hydroxyphenyl)ethyl]-1H-benzimidazol-6-yl}methylene)-1,3-thiazolidine-2,4-dione,

methyl 4-{6-[(2,4-dioxo-1,3-thiazolidin-5-ylidene)methyl]-1H-benzimidazol-1-yl}cyclohexanecarboxylate,

5-({1-[2-(5-methoxy-1H-indol-3-yl)ethyl]-1H-benzimidazol-6-yl}methylene)-1,3-thiazolidine-2,4-dione,

5-({1-[(1-methyl-1H-pyrazol-4-yl)methyl]-1H-benzimidazol-6-yl}methylene)-1,3-thiazolidine-2,4-dione,

5-({1-[2-(3,4-dimethoxyphenyl)ethyl]-1H-benzimidazol-6-yl}methylene)-1,3-thiazolidine-2,4-dione,

5-({1-[2-(4-phenoxyphenyl)ethyl]-1H-benzimidazol-6-yl}methylene)-1,3-thiazolidine-2,4-dione,

5-({1-[4-(trifluoromethyl)benzyl]-1H-benzimidazol-6-yl}methylene)-1,3-thiazolidine-2,4-dione,

4-{6-[(2,4-dioxo-1,3-thiazolidin-5-ylidene)methyl]-1H-benzimidazol-1-yl}cyclohexanecarboxylic acid,

5-[(1-isobutyl-1H-benzimidazol-6-yl)methylene]-1,3-thiazolidine-2,4-dione,

5-({1-[2-(1,3-benzodioxol-4-yl)ethyl]-1H-benzimidazol-6-yl}methylene)-1,3-thiazolidine-2,4-dione,

5-({1-[2-(2-phenoxyphenyl)ethyl]-1H-benzimidazol-6-yl}methylene)-1,3-thiazolidine-2,4-dione,

5-[1-(3,3-diphenylpropyl)-1H-benzimidazol-6-yl]methylene}-1,3-thiazolidine-2,4-dione,

5-{{1-(2-methoxybenzyl)-1H-benzimidazol-6-yl]methylene}-1,3-thiazolidine-2,4-dione,

5-{{1-(3-furylmethyl)-1H-benzimidazol-6-yl]methylene}-1,3-thiazolidine-2,4-dione,

5-[(1-propyl-1H-benzimidazol-6-yl)methylene]-1,3-thiazolidine-2,4-dione,

5-Quinoxalin-6-ylmethylene-thiazolidine-2,4-dione,

5-Quinoxalin-6-ylmethylene-2-thioxo-thiazolidin-4-one,

2-Imino-5-quinoxalin-6-ylmethylene-thiazolidin-4-one,₁

5-Benzothiazol-6-ylmethylene-thiazolidine-2,4-dione,₁

5-(3-Methyl-benzofuran-5-ylmethylene)-thiazolidine-2,4-dione,₁

5-(2-Bromo-3-methyl-benzofuran-5-ylmethylene)-thiazolidine-2,4-dione,₁

5-(3-bromo-benzofuran-5-ylmethylene)-thiazolidine-2,4-dione,₁

3-[5-(2,4-Dioxo-thiazolidin-5-ylidenemethyl)-benzofuran-3-yl]-acrylic acid ethyl ester,₁

3-[5-(2,4-Dioxo-thiazolidin-5-ylidenemethyl)-benzofuran-3-yl]-acrylic acid,₁

5-[3-(3-Oxo-3-piperidin-1-yl-propenyl)-benzofuran-5-ylmethylene]-thiazolidine-2,4-dione,₁

Methyl 1-((3-{5-[(2,4-dioxo-1,3-thiazolidin-5-ylidene)methyl]-1-benzofuran-3-yl}prop-2-enoyl)prolinate),₁

Methyl 1-((3-{5-[(2,4-dioxo-1,3-thiazolidin-5-ylidene)methyl]-1-benzofuran-3-yl}prop-2-enoyl)-D-prolinate),₁

(5-({3-[(3-oxo-3-pyrrolidin-1-ylprop-1-en-1-yl]-1-benzofuran-5-yl}methylene)-1,3-thiazolidine-2,4-dione),₁

5-({3-[3-morpholin-4-yl-3-oxoprop-1-en-1-yl]-1-benzofuran-5-yl}methylene)-1,3-thiazolidine-2,4-dione,₁

Methyl 1-(3-{5-[(2,4-dioxo-1,3-thiazolidin-5-ylidene)methyl]-1-benzofuran-3-yl}prop-2-enoyl)-L-prolinate,₁

N-cyclohexyl-3-{5-[(2,4-dioxo-1,3-thiazolidin-5-ylidene)methyl]-1-benzofuran-3-yl}-N-methylacrylamide,₁

3-{5-[(2,4-dioxo-1,3-thiazolidin-5-ylidene)methyl]-1-benzofuran-3-yl}-N-ethyl-N-(2-hydroxyethyl)acrylamide,₁

N-cyclobutyl-3-{5-[(2,4-dioxo-1,3-thiazolidin-5-ylidene)methyl]-1-benzofuran-3-yl}
acrylamide,

5-({3-[3-azetidin-1-yl-3-oxoprop-1-en-1-yl]-1-benzofuran-5-yl} methylene)-1,3-
thiazolidine-2,4-dione,

5-({3-[3-(1,3-dihydro-2H-isoindol-2-yl)-3-oxoprop-1-en-1-yl]-1-benzofuran-5-
yl} methylene)-1,3-thiazolidine-2,4-dione,

5-({3-[3-azepan-1-yl-3-oxoprop-1-en-1-yl]-1-benzofuran-5-yl} methylene)-1,3-
thiazolidine-2,4-dione,

3-{5-[(2,4-dioxo-1,3-thiazolidin-5-ylidene)methyl]-1-benzofuran-3-yl}-N-piperidin-1-
ylacrylamide,

3-{5-[(2,4-dioxo-1,3-thiazolidin-5-ylidene)methyl]-1-benzofuran-3-yl}-N-(pyridin-3-
ylmethyl)acrylamide,

N-cyclohexyl-3-{5-[(2,4-dioxo-1,3-thiazolidin-5-ylidene)methyl]-1-benzofuran-3-yl}
acrylamide,

5-({3-[3-(4-methylpiperazin-1-yl)-3-oxoprop-1-en-1-yl]-1-benzofuran-5-
yl} methylene)-1,3-thiazolidine-2,4-dione,

N-cycloheptyl-3-{5-[(2,4-dioxo-1,3-thiazolidin-5-ylidene)methyl]-1-benzofuran-3-
yl} acrylamide,

5-({3-[3-(2,5-dihydro-1H-pyrrol-1-yl)-3-oxoprop-1-en-1-yl]-1-benzofuran-5-yl}
methylene)-1,3-thiazolidine-2,4-dione,

N-cyclopentyl-3-{5-[(2,4-dioxo-1,3-thiazolidin-5-ylidene)methyl]-1-benzofuran-3-
yl} acrylamide,

3-[5-(2,4-Dioxo-thiazolidin-5-ylidenemethyl)-benzofuran-3-yl]-propionic acid ethyl
ester,

3-[5-(2,4-Dioxo-thiazolidin-5-ylidenemethyl)-benzofuran-3-yl]-propionic acid,

5-[3-(3-Oxo-3-piperidin-1-yl-propyl)-benzofuran-5-ylmethylene]-thiazolidine-2,4-dione,

6-(2,4-Dioxo-thiazolidin-5-ylidenemethyl)-2,3-dihydro-benzo[1,4]oxazine-4-carboxylic acid tert-butyl ester,

5-(3,4-Dihydro-2H-benzo[1,4]oxazin-6-ylmethylene)-thiazolidine-2,4-dione,

5-(4-Benzoyl-3,4-dihydro-2H-benzo[1,4]oxazin-6-ylmethylene)-thiazolidine-2,4-dione,

5-(4-Acetyl-3,4-dihydro-2H-benzo[1,4]oxazin-6-ylmethylene)-thiazolidine-2,4-dione,
6-(2,4-Dioxo-thiazolidin-5-ylidenemethyl)-benzo[1,4]oxazine-4-carboxylic acid tert-butyl ester,

[6-(2,4-Dioxo-thiazolidin-5-ylidenemethyl)-3-oxo-2,3-dihydro-benzo[1,4]-oxazin-4-yl]-acetic acid methyl ester,

N-Benzyl-2-[6-(2,4-dioxo-thiazolidin-5-ylidenemethyl)-3-oxo-2,3-dihydro-benzo[1,4]oxazin-4-yl]-acetamide,

~~5-(4-Butyl-3-oxo-3,4-dihydro-2H-benzo[1,4]oxazin-6-ylmethylene)-thiazolidine-2,4-dione~~

5-(4-Butyl-3-oxo-3,4-dihydro-2H-benzo[1,4]oxazin-6-ylmethylene)-thiazolidine-2,4-dione,

5-(4-Benzyl-3-oxo-3,4-dihydro-2H-benzo[1,4]oxazin-6-ylmethylene)-thiazolidine-2,4-dione,

5-(2-Chloro-benzofuran-5-ylmethylene)-thiazolidine-2,4-dione,

5-(3-Amino-benzo[d]isoxazol-5-ylmethylene)-thiazolidine-2,4-dione,

5-(3-Phenylethynyl-benzofuran-5-ylmethylene)-thiazolidine-2,4-dione,

5-Benzo[1,2,5]thiadiazol-5-ylmethylene-thiazolidine-2,4-dione,

5-Benzo[1,2,5]oxadiazol-5-ylmethylene-thiazolidine-2,4-dione,

5-(2-Methyl-benzofuran-6-ylmethylene)-thiazolidine-2,4-dione,

5-(2-Carboxymethyl-benzofuran-6-ylmethylene)-thiazolidine-2,4-dione,

5-(3-Bromo-2-fluoro-2,3-dihydro-benzofuran-6-ylmethylene)-thiazolidine-2,4-dione,

and

5-(2-Fluoro-benzofuran-6-ylmethylene)-thiazolidine-2,4-dione.

Claim 26 (Currently Amended): A method of preparing a medicament, comprising, contacting the thiazolidinone-vinyl fused-benzene derivative according to claim 19, with one or more pharmaceutically acceptable additives ~~any of claims 19 to 25 for use as a~~ medicament.

Claim 27 (Currently Amended): A pharmaceutical composition, comprising ~~containing~~ at least one thiazolidinone-vinyl fused-benzene derivative according to claim 19, ~~any of claims 19 to 25~~ and a pharmaceutically acceptable carrier, diluent or excipient thereof.

Claim 28 (Currently Amended): A method ~~Use of a thiazolidinone-vinyl fused-benzene derivative according to any of claims 19 to 25 for the preparation of a medicament~~ for the prophylaxis and/or treatment of one or more diseases or disorders, selected from autoimmune disorders and/or inflammatory diseases, cardiovascular diseases, neurodegenerative diseases, bacterial or viral infections, kidney diseases, platelet aggregation, cancer, graft rejection or lung injuries, comprising, administering to a subject in need thereof, an effective amount of the thiazolidinone-vinyl fused-benzene derivative according to claim 19.

Claim 29 (Currently Amended): ~~The method Use of a thiazolidinone-vinyl fused-benzene derivative~~ according to claim 28, wherein said one or more diseases are selected from ~~in~~ the group consisting of including multiple sclerosis, psoriasis, rheumatoid arthritis, ~~multiple sclerosis~~[[,]] systemic lupus erythematosus, inflammatory bowel disease, lung inflammation, and thrombosis or brain infection/inflammation such as meningitis or encephalitis.

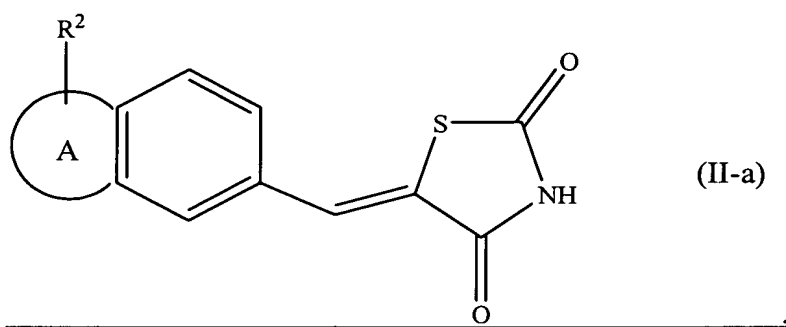
Claim 30 (Currently Amended): ~~The method Use of a thiazolidinone-vinyl fused-benzene derivative~~ according to claim 28, wherein the said one or more diseases are selected from ~~in~~ the group consisting of including Alzheimer's disease, Huntington's disease, CNS trauma, stroke and ~~or~~ ischemic conditions.

Claim 31 (Currently Amended): ~~The method Use of a thiazolidinone-vinyl fused-benzene derivative~~ according to claim 28, wherein said one or more diseases are selected from ~~in~~ the group consisting of including atherosclerosis, heart hypertrophy, cardiac myocyte dysfunction, elevated blood pressure and ~~or~~ vasoconstriction.

Claim 32 (Currently Amended): ~~The method Use of a thiazolidinone-vinyl fused-benzene derivative~~ according to claim 28, wherein said one or more diseases are selected from ~~in~~ the group consisting of including chronic obstructive pulmonary disease, anaphylactic shock fibrosis, psoriasis, allergic diseases, asthma, stroke or ischemic conditions, ischemia-reperfusion, platelets aggregation/activation, skeletal muscle atrophy/hypertrophy, leukocyte recruitment in cancer tissue, angiogenesis, invasion metastasis, ~~in particular~~ melanoma, Karposi's sarcoma, acute and chronic bacterial and viral infections, sepsis, transplantation, graft rejection, pancreatitis, multiorgane failure, glomerulo

sclerosis, glomerulo nephritis, progressive renal fibrosis, endothelial and epithelial injuries in the lung and or in general lung airways inflammation.

Claim 33 (Currently Amended): A method for the prophylaxis and/or treatment of one or more diseases mediated by PI3 kinase, comprising administering to a subject in need thereof, an effective amount of a thiazolidinone-vinyl fused-benzene derivative according to formula (II-a): Use according to any of claims 28 to 32 for the modulation, particularly the inhibition of PI3Kinase activity

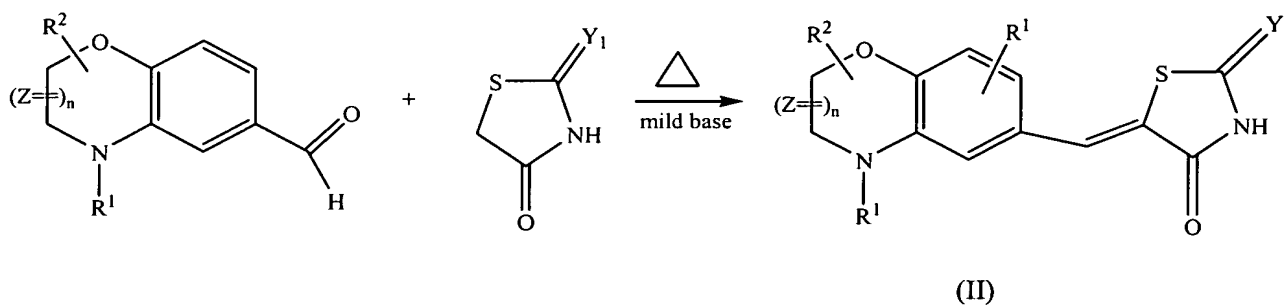


wherein A is selected from the group consisting of dioxol, dioxin, dihydrofuran, (dihydro) furanyl, (dihydro)oxazinyl, pyridinyl, isooxazolyl, oxazolyl (dihydro)naphthalenyl, pyrimidinyl, triazolyl, imidazolyl, pyrazinyl, thiazolidinyl, thiadiazolyl, and oxadiazolyl;

R² is selected from the group consisting of H, halogen, acyl, amino, C₁-C₆-alkyl, C₂-C₆-alkenyl, C₂-C₆-alkynyl, C₁-C₆-alkyl carboxy, C₁-C₆-alkyl acyl, C₁-C₆-alkyl alkoxycarbonyl, C₁-C₆-alkyl aminocarbonyl, C₁-C₆-alkyl acyloxy, C₁-C₆-alkyl acylamino, C₁-C₆-alkyl ureido, C₁-C₆-alkyl carbamate, C₁-C₆-alkyl amino, C₁-C₆-alkyl alkoxy, C₁-C₆-alkyl sulfanyl, C₁-C₆-alkyl sulfinyl, C₁-C₆-alkyl sulfonyl, C₁-C₆-alkyl sulfonylaminoaryl, aryl, C₃-C₈-cycloalkyl or heterocycloalkyl, C₁-C₆-alkyl aryl, C₂-C₆-alkenyl-aryl, C₂-C₆-alkynyl aryl, carboxy, cyano, hydroxy, C₁-C₆-alkoxy, nitro, acylamino, ureido, sulfonylamino, sulfanyl, and sulfonyl.

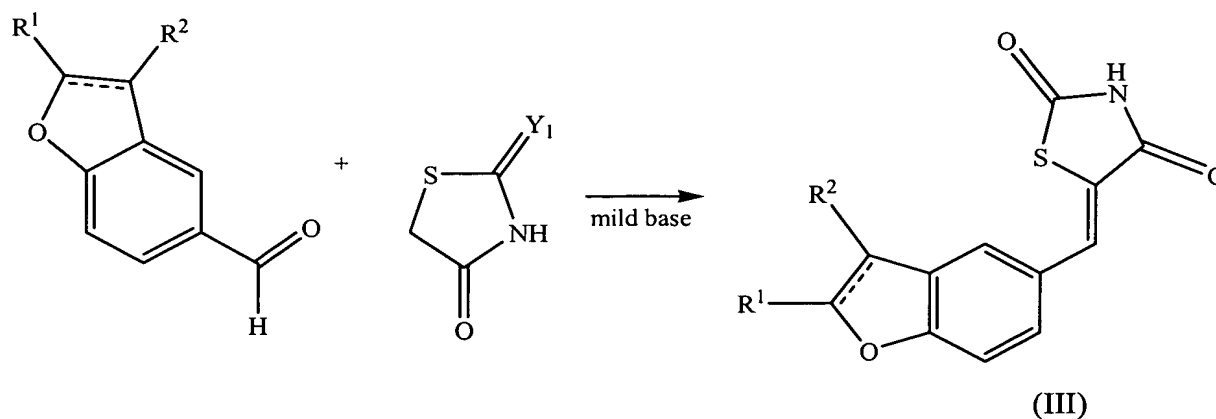
Claim 34 (Currently Amended): The method Use according to claim 33, wherein said PI3 Kinase PI3Kinase is a PI3 Kinase-γ PI3Kinase-γ.

Claim 35 (Currently Amended): A method of preparing a thiazolidinone-vinyl fused-benzene ~~derivatives~~ derivative of formula (I) ~~(II)~~, according to claim 20, comprising the following step:



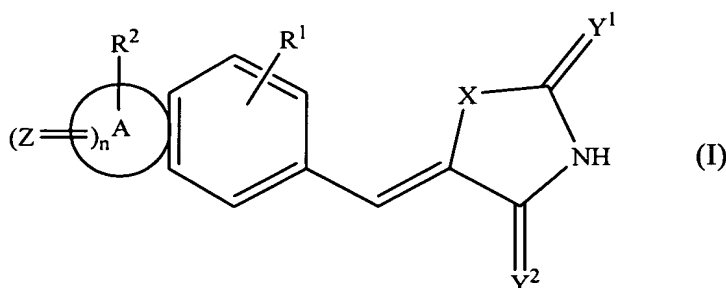
wherein R¹, R², Y¹, Z and n are as above defined in formula (II).

Claim ~~36~~ 33 (Currently Amended): A method of preparing a thiazolidinone-vinyl fused-benzene derivative ~~derivatives~~ of formula (III), according to claim 23, comprising the following step:



wherein R¹, R² ~~and Y¹~~ are as above defined for formula (III), and Y¹ is O, S or NH.

Claim 37 (New): A composition, comprising, a compound according to formula (I):



as well as its geometrical isomers, its optically active forms as enantiomers, diastereomers and its racemate forms, as well as pharmaceutically acceptable salts and pharmaceutically active derivatives thereof, wherein

A is a 5-8 membered heterocyclic or carbocyclic group, wherein said carbocyclic group may be fused with aryl, heteroaryl, cycloalkyl or heterocycloalkyl;

X is S, O or NH;

Y¹ and Y² are independently S, O or NH;

Z is S or O;

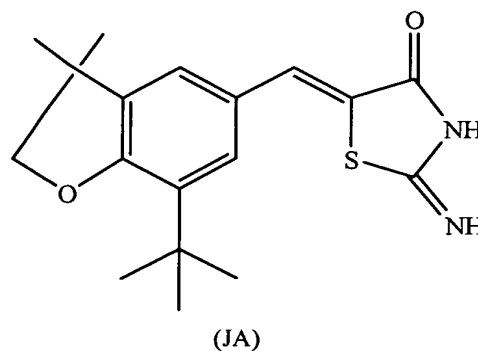
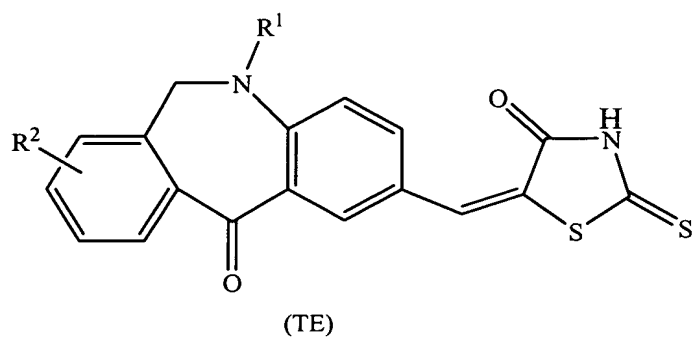
R¹ is H, CN, carboxy, acyl, C₁-C₆-alkoxy, halogen, hydroxy, acyloxy, C₁-C₆-alkyl carboxy, C₁-C₆-alkyl acyloxy, C₁-C₆-alkyl alkoxy, alkoxycarbonyl, C₁-C₆-alkyl alkoxycarbonyl, aminocarbonyl, C₁-C₆-alkyl aminocarbonyl, acylamino, C₁-C₆-alkyl acylamino, ureido, C₁-C₆-alkyl ureido, amino, C₁-C₆-alkyl amino, ammonium, sulfonyloxy, C₁-C₆-alkyl sulfonyloxy, sulfonyl, C₁-C₆-alkyl sulfonyl, sulfinyl, C₁-C₆-alkyl sulfinyl, sulfanyl, C₁-C₆-alkyl sulfanyl, sulfonylamino, C₁-C₆-alkyl sulfonylamino or carbamate;

R² is selected from the group consisting of H, halogen, acyl, amino, C₁-C₆-alkyl, C₂-C₆-alkenyl, C₂-C₆-alkynyl, C₁-C₆-alkyl carboxy, C₁-C₆-alkyl acyl, C₁-C₆-alkyl alkoxycarbonyl, C₁-C₆-alkyl aminocarbonyl, C₁-C₆-alkyl acyloxy, C₁-C₆-alkyl acylamino, C₁-C₆-alkyl ureido, C₁-C₆-alkyl amino, C₁-C₆-alkyl alkoxy, C₁-C₆-alkyl sulfanyl, C₁-C₆-alkyl

sulfinyl, C₁-C₆-alkyl sulfonyl, C₁-C₆-alkyl sulfonylaminoaryl, aryl, C₃-C₈-cycloalkyl or heterocycloalkyl, C₁-C₆-alkyl aryl, C₂-C₆-alkenyl-aryl, C₂-C₆-alkynyl aryl, carboxy, cyano, hydroxy, C₁-C₆-alkoxy, nitro, acylamino, ureido, C₁-C₆-alkyl carbamate, sulfonylamino, sulfanyl, or sulfonyl;

n is 0, 1 or 2;

with the proviso that the following compounds are excluded:



wherein R¹ is a lower alkyl or aralkyl and R² is H or a halogen.